

## CLAIMS:

1. A solid fuel element, which includes a body of combustible material which is impregnated with an accelerant composition, including a liquid fuel and an evaporation inhibiting agent selected from thermoplastic elastomers, organic derivatives of clays, zirconium acetate and aluminium octanoate.
2. A solid fuel element as claimed in Claim 1, in which the body of combustible material is a briquette made of a compressed combustible material.
3. A solid fuel element as claimed in Claim 2, in which the compressed combustible material is selected from carbonaceous material, cellulosic material and granular coal.
4. A solid fuel element as claimed in Claim 1, in which the body of combustible material is of coal.
5. A solid fuel element as claimed in any one of Claims 1 to 4, inclusive, in which the body is sealed with a flammable sealant.
6. A solid fuel element as claimed in Claim 5, in which a major portion of the at flammable sealant is disposed beneath a surface of the body.
7. A solid fuel element as claimed in Claim 5 or Claim 6, in

which the flammable sealant is in the form of a hydrocarbon wax composition.

8. A solid fuel element as claimed in any one of Claims 1 to 7, inclusive, in which the liquid fuel is liquid paraffin.

9. A solid fuel element as claimed in Claim 8, in which the liquid fuel is selected from C<sub>9</sub> to C<sub>13</sub> paraffins and mixtures of C<sub>9</sub> to C<sub>13</sub> paraffins.

10. A solid fuel element as claimed in any one of Claims 1 to 9, inclusive, in which the evaporation inhibiting agent is selected from a thermoplastic elastomer and a thermoplastic elastomer/oil blend.

11. A solid fuel element as claimed in Claim 10, in which the thermoplastic elastomer is a rubber-styrene copolymer.

12. A solid fuel element as claimed in Claim 11, in which the rubber is selected from polyethylene/butylene and polyethylene/propylene.

13. A solid fuel element as claimed in Claim 11 or Claim 12, in which the rubber-styrene copolymer includes at least 33 % by mass of styrene.

14. A solid fuel element as claimed in any one of Claims 1 to 9, inclusive, in which the evaporation inhibiting agent is provided by an organic derivative of a bentonite clay.

15. A method of making a solid fuel element, which method includes the step of at least partially immersing a body of combustible material in an accelerant composition, including a liquid fuel and an evaporation inhibiting agent selected from thermoplastic elastomers, organic derivatives of clays, zirconium acetate and aluminium octanoate, so that at least some of the accelerant composition is absorbed by the combustible material to produce an accelerant-impregnated body of combustible material.

16. A method as claimed in Claim 15, in which the liquid fuel is a liquid paraffin.

17. A method as claimed in Claim 16, in which the liquid fuel is selected from C<sub>9</sub> to C<sub>13</sub> paraffins and mixtures of C<sub>9</sub> to C<sub>13</sub> paraffins.

18. A method as claimed in any one of Claims 15 to 17, inclusive, in which the evaporation inhibiting agent is selected from a thermoplastic elastomer and a thermoplastic elastomer/oil blend.

19. A method as claimed in Claim 18, in which the thermoplastic elastomer is a rubber-styrene copolymer.

20. A method as claimed in Claim 19, in which the rubber is selected from polyethylene/butylene and polyethylene/propylene.

21. A method as claimed in Claim 19 or Claim 20, in which the rubber-styrene copolymer includes at least 33 % by mass of styrene.

22. A method as claimed in any one of Claims 15 to 17, inclusive, in which the evaporation inhibiting agent is an organic derivative of a bentonite clay.

23. A method as claimed in any one of Claims 15 to 22, inclusive, in which the body of combustible material is a briquette of compressed material selected from charcoal, granular coal and cellulosic material, the method including the prior step of compressing the charcoal, granular coal or cellulosic material to form the briquette.

24. A method as claimed in any one of Claims 15 to 23, inclusive, which includes subjecting the body of combustible material to reduced pressure prior to immersing the body in said accelerant composition.

25. A method as claimed in any one of Claims 15 to 24, inclusive, which includes subjecting the body of combustible material to reduced pressure in the course of immersing the body in said accelerant composition.

26. A method as claimed in Claim 24 or Claim 25, in which the body is subjected to a reduced pressure of between 96 kPa and 99 kPa.

27. A method as claimed in any one of Claims 24 to 26, inclusive, in which the body is thereafter subjected to increased pressure.

28. A method as claimed in Claim 27, in which the body is

subjected to an increased pressure of between 136 kPa and 140 kPa.

29. A method as claimed in any one of Claims 15 to 28, inclusive, in which the body of combustible material is at least partially immersed in the accelerant composition for a period of between twenty seconds and four minutes.

30. A method as claimed in any one of Claims 15 to 29, inclusive, which further includes sealing the accelerant-impregnated body of combustible material with a sealing material.

31. A method as claimed in Claim 30, in which the sealing material is a hydrocarbon wax composition, sealing the body including at least partially immersing the accelerant-impregnated body of combustible material in a bath of molten hydrocarbon wax composition.

32. A method as claimed in Claim 31, in which the accelerant-impregnated body of combustible material is at least partially immersed in the bath of molten wax composition for a period of between five seconds and thirty seconds.

33. An accelerant composition for impregnating a body of combustible material, which accelerant composition includes

an evaporation inhibiting agent selected from a thermoplastic elastomer, a thermoplastic elastomer/oil blend, an organic derivative of a clay, zirconium acetate and aluminium octanoate; and  
a liquid fuel.

## 23

34. An accelerant composition as claimed in Claim 33, in which the evaporation inhibiting agent is a thermoplastic elastomer, the thermoplastic elastomer being provided by a rubber-styrene copolymer.

35. An accelerant composition as claimed in Claim 34, in which the rubber is selected from polyethylene/butylene and polyethylene/propylene.

36. An accelerant composition as claimed in Claim 34 or Claim 35, in which the rubber-styrene copolymer includes at least 33 % by mass of styrene.

37. An accelerant composition as claimed in Claim 33, in which the evaporation inhibiting agent is an organic derivative of a clay, the clay being a bentonite clay.

38. An accelerant composition as claimed in any one of Claims 33 to 37, inclusive, in which the liquid fuel is a liquid paraffin.

39. An accelerant composition as claimed in Claim 38, in which the liquid fuel is selected from C<sub>9</sub> to C<sub>13</sub> paraffins and mixtures of C<sub>9</sub> to C<sub>13</sub> paraffins.

40. A solid fuel element, which includes a body of combustible material having a seal of a flammable sealant, a major portion of which is disposed beneath the surface of the body.

41. A solid fuel element as claimed in Claim 40, in which the

flammable sealant is in the form of a hydrocarbon wax composition.

42. A solid fuel element as claimed in Claim 41, in which the hydrocarbon wax composition is a paraffin wax/resin blend.